

Work Order ID 82814

April-10-12 10:41:25 AM

82814

Page 1

Item ID: D3269-2 Accept ***N900040100*** Setup Start ***NS1***
 Revision ID: Stop ***NS2***
 Item Name: Bubble Window, RH
 Start Date: 10/04/2012 Start Qty: 2.00 ***2*** Cust Item ID:
 Required Date: 24/04/2012 Req'd Qty: 2.00 ***2*** Customer:
 Reference:

Approvals: Process Plan: MLJ Date: 12/04/10 Tooling: _____ Date: _____ Run Start ***NR1***
 QC: _____ Date: _____ SPC (Y/N): _____ Date: _____ Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
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Draw Nbr	Revision Nbr
D3269	Rev E

100 0.00
100 HAND FINISHING THERMOFORMING
 Thermoform Memo 0.00 B 12/05/15
 Thermoforming Machine Set up Clamping Frame and Load Programas per Folio FTA 014

110 0.00
110 HAND FINISHING THERMOFORMING
 Thermoform Memo 0.00 2 B 12/05/15
 Thermoforming Machine Cut Blanks to 30" by 48"

120 0.00
120 THERMOFORMING MACHINE
 Thermoform Memo 0.00 2 B 12/05/15
 Thermoforming Machine Thermoform as per Dwg. D3269 and Folio FTA 014 Dwg. Rev.
E Folio Rev. C

W/O:		WORK ORDER CHANGES					
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Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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NOTE: Date & initial all entries

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Page 2

Accept

N900040100

Setup Start *NS1*

Stop *NS2*

Cust Item ID:

Start Date: 10/04/2012 **Start Qty:** 2.00

2

Required Date: 24/04/2012 **Req'd Qty:** 2.00

2

Customer:

Reference:

Approvals: **Process Plan:** _____ **Date:** _____ **Tooling:** _____ **Date:** _____

Run Start *NR1*

QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Stop *NR2*

**Insp.
Stamp**

0.00

130

QC

Memo

0.00

Quality Control

1) Check Surface finish for undesired marks, voids, dimples etc. 2) Check depth of bubble to ensure conformity to drawing tolerances.

0.00

140

QC

Memo

0.00

Quality Control

0.00

150

Thermoform

Memo

0.00

Thermoforming Machine

1) Trim off excess flange material 2) Buff out any light scratches or blemishes 3) Etch part number and batch number

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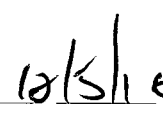
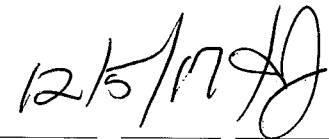
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Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
160 *160* QC Quality Control	QC5- Inspect part completeness to step on W/O Memo 1) Visually inspect for clarity, and proper formation.	0.00 0.00							
170 *170* Packaging Packaging	Identify as per dwg & Stock Location: _____ Packaging Memo	0.00 0.00							
180 *180* QC Quality Control	QC21- Final Inspection - Work Order Release Memo	0.00 0.00						 ME 12-05-17	

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Picklist Print

April-10-12 10:41:28 AM

Page 1

Work Order ID: 82814

82814

Parent Item: D3269-2

D3269-2

Parent Item Name: Bubble Window, RH

Start Date: 10/04/2012

Required Date: 24/04/2012

Start Qty: 2.00

Required Qty: 2.00

Comments: IPP A 05.03.22 New issue KJ/JLM
IPP B 05.05.09 Added engraving EC
IPP Rev:06-07-03 As per Rev C JLM
IPP C 07.11.06 Thermoform in-house DL verified by:EC
IPP Rev: D 08.07.24 As per New Tool DL.

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
MACRYLICS.177		Purchased		No			sf	191.9563		24.12211			
MACRYLICS 177									**	24.122		B12/05/12	
0.177" PLEXIGLAS G CLEAR CAST ACRYLIC SHEET													

Location

Loc Qty

Loc Code

therm

191.956295

116796

20.501785

119505

63.92818

120972

107.52633

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DART AEROSPACE LTD		Work Order:	82814
Description: Bubble Window, RH (R44)		Part Number:	D3269-2
Inspection Dwg: D3269	Rev: E	Page 1 of 1	

FIRST ARTICLE INSPECTION CHECKLIST

☒ First Article ☐ Prototype

THERMOFORMING SECTION

Description	Accept	Reject	Method of Inspection	Comments
Depth of bubble within tolerances	✓			
Shape Definition	✓			
Material imperfections such as bumps, cracks, voids, scratching	✓			

Measured by: <i>BB</i>	Date: 12/05/16
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TRIMMING SECTION

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
10.0	+/-0.25	10.181 / 10.125 ✓	✓			
6.2	0.036 Min	.074 / .072 ✓	✓			
3.8	0.057 Min	.113 / .115 ✓	✓			

Measured by: <i>BB</i>	Date: 12/05/16
Audited by: <i>DR</i>	Date: 12/05/16
Prototype Approval:	Date:

Rev	Date	Change	Revised by	Approved
A	08.11.27	New Issue	KJ/DL	
B	09.10.16	Tolerances revised per Dwg Rev E	KJ	

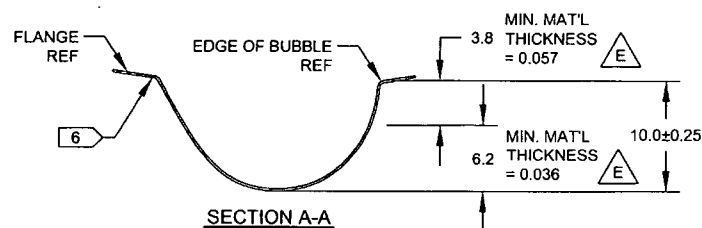
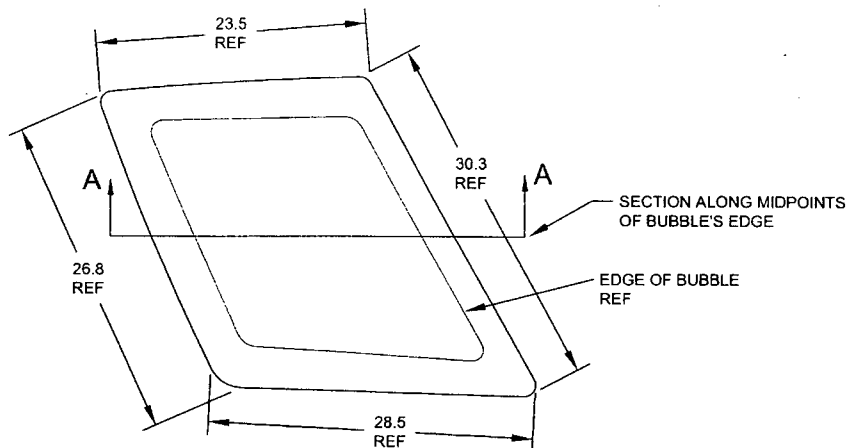
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D3269-1 BUBBLE WINDOW, LH

NOTES:

- 1) MATERIAL: PLEXIGLAS G CLEAR CAST ACRYLIC SHEET PER LP-391 TYPE 1 GRADE C OR POLYCAST II CLEAR ACRYLIC SHEET PER MIL-P-5425
0.177 TO 0.188 THICK (STOCK, REF DART SPEC M-ACRYLIC-S)
 - 2) FINISH: NONE
 - 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
 - 4) UNITS: INCHES UNLESS OTHERWISE NOTED
 - 5) BREAK SHARP EDGES: 0.010 TO 0.020 MAX
 - 6) IDENTIFICATION: ENGRAVE P/N & B/N ON FLANGE WITHIN 0.25" OF BUBBLE. USE 0.125" LETTERS TO MAX DEPTH OF 0.005".
 - 7) WEIGHT: 4.88 lbs
 - 8) FORM PER D3269-1T1 AND QSI 022
- FORMING PROCESS:
- (a) DRAPE OVER D3269-1T1 MOLD
 - (b) HEAT TO 290°F
 - (c) VACUUM FORM TO SPECIFIED HEIGHT
 - (d) LET COOL TO AT LEAST 100°F BEFORE HANDLING
 - (e) TRIM FLANGE TO PROFILE OF MOLD

SHOP COPY
RETURN TO
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UNCONTROLLED COPY
SUBJECT TO AMENDMENT

WITHOUT NOTICE
WORK ORDER

NO. 82814 M/LJ
12/04/10

RELEASED
2009-09-23

E	0.057 WAS 0.095 (ZN C6-1, C7-2); 0.036 WAS 0.050 (ZN B6-1, B7-2) PER PAR 09-029	RF	09.08.21
D	REFORMAT, CHG OVERALL REF DIMS, CHG FORMING PROC (A8-1, A8-2). MIN WALL WAS 0.100 NOW 0.095 (C6-1, C7-2)	CP	08.02.13
C	NO LONGER TRIMMED	CP	06.06.22
B	UPDATE MATERIAL SPEC.	CP	05.03.10
A	NEW ISSUE	CP	05.02.18
REV.	DESCRIPTION	BY	DATE
DESIGN	RF	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	RF		
CHECKED	RF	DRAWING NO.	REV. E
MFG. APPR.	RF	D3269	SHEET 1 OF 2
APPROVED	RF	TITLE	SCALE
DE APPR.	RF	BUBBLE WINDOW	NTS
DATE	09.08.21	COPYRIGHT © 2005 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.	

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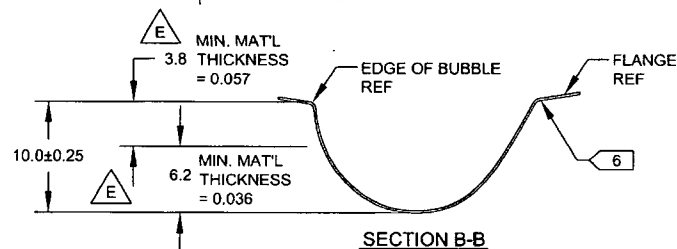
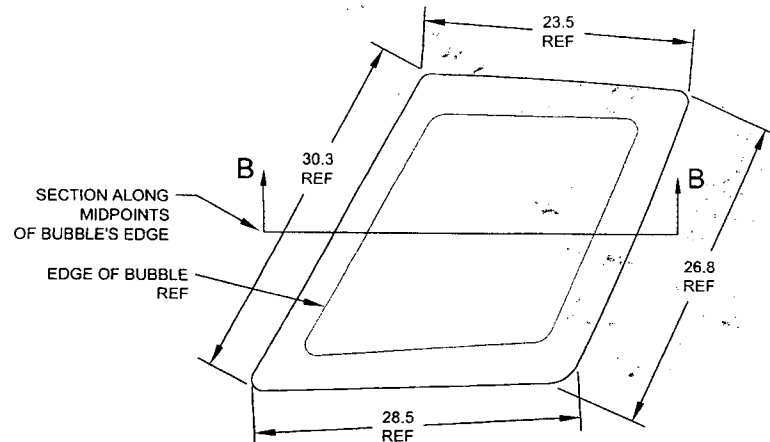
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8 7 6 5 4 3 2 1

02814



D3269-2 BUBBLE WINDOW, RH

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RELEASED
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DESIGN	92	DART AEROSPACE LTD	
DRAWN	RF	HAWKESBURY, ONTARIO, CANADA	
CHECKED	UP	DRAWING NO. D3269	REV. E
MFG. APPR.	UP		SHEET 2 OF 2
APPROVED	UP	TITLE	SCALE
DE APPR.	UP	BUBBLE WINDOW	NTS
DATE	09.08.21	COPYRIGHT © 2005 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.	

8 7 6 5 4 3 2 1

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